CALIFORNIA STRATEGIC GROWTH COUNCIL

CLIMATE CHANGE RESEARCH PROGRAM

List of Round 2 Grant Awards

Award	Title	Description	Institution	PI	Duration
$4,711,267.24	**Working Lands Innovation Center—Catalyzing Negative Carbon Emissions**	This Innovation Center will scale-up application and demonstrations of soil amendment technologies statewide, with critical partnerships and support. It will also quantify net cumulative carbon emissions impacts across temporal and spatial scales in California's upland agricultural systems to assess the potential for the proposed agricultural practices to contribute to CA's statewide GHG reduction goals (e.g. 2045 target of net zero carbon emissions). Soil amendment technologies being explored include rock amendments, compost, and biochar, which will be applied individually and in combination. This proposal is the first time these soil technologies will be applied in combination at sites across California.	University of California, Office of the President	Benjamin Z. Houlton	36 Months
$4,604,140.02	**Innovation Center for Advancing Ecosystem Climate Solutions**	This Innovation Center will develop the science and technology solutions needed to manage California's natural lands for climate change, a critical gap to addressing the state's goals for forest management and increased carbon sequestration in wildlands. The proposal will develop new knowledge through measurements and modeling, synthesize the resulting data to produce tools that will enhance land-management planning and monitoring, and facilitate adaptive management. The proposal will also verify multi-sector benefits, advance implementation approaches, and communicate results through a range of outreach efforts The Center includes many partners; it will bridge universities, governmental, and non-governmental organizations, improving the transfer of knowledge among organization. It will simultaneously serve rural DACs, increasing economic and community resilience in areas that are at threat from climate change impacts to forests and other wildlands.	University of California, Irvine	Michael L. Goulden	36 Months
$3,040,239.47	**Mobile Biochar Production for Methane Emission Reduction and Soil Amendment**	The overall goal of this proposal is to determine how biochar can be produced and used in a closed cycle agricultural application to reduce GHG emissions, ameliorate agricultural waste disposal problems, improve the quality of life in low-income and disadvantage farming and adjacent communities, and identify means to gain acceptance among farmers of small-scale biochar production and use as a sustainable best practice for California agriculture. The proposal will develop and fully demonstrate in the field a mobile platform for at-source biochar production.	University of California, Merced	Gerardo C. Diaz	36 Months
$4,744,353.28	**Innovative Low-GHG Residential Space Conditioning Technologies**	This research will provide innovative advancements with integrated system solutions for HVAC systems using low-Global Warming Potential (GWP) refrigerants, targeting residential space conditioning and focused on low-income and disadvantaged communities (both single-family and multi-family homes). The core technologies proposed reduce GHG emissions by using low-GWP refrigerants, improving system efficiencies, and integrating renewable power generation using thermal storage. The proposal will advance commercialization and adoption of these technologies both through its partnerships and by establishing a blueprint for improved technology adoption and engagement mechanisms, including payment and financing solutions and evaluating user behavior.	Electric Power Research Institute	Sara Beaini	36 Months